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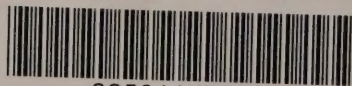
THE UK FORESIGHT PROGRAMME
INTERNATIONAL IMPLICATIONS

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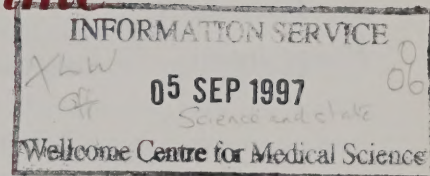
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The UK Foresight Programme



International implications

The UK Foresight Programme is a major initiative which aims to identify opportunities in markets and technologies which will enhance the nation's prosperity and quality of life. The findings and recommendations have had a widespread impact, placing science and technology in a wider context and emphasising their contribution to business competitiveness. The results are informing decisions on policy and research spending by Government and business.

The programme has many implications for international companies and potential inward investors seeking to establish a base in the UK. Some of these implications are highlighted below. Further information can be obtained from the literature listed at the end of this brief.

Overall aims of the Foresight Programme

1. To create enduring networks linking business, academia and Government
2. To establish a culture of forward-thinking about market opportunities and requirements and the technology and other priorities arising from them
3. To build a consensus about the key role of science and technology in wealth creation and improving quality of life
4. To inform the policy and spending priorities of both the public and private sectors.

International implications of the Foresight Programme

The Foresight Programme is contributing to the UK's competitiveness in the medium to long term, ensuring that it is in a better position to meet market and technology opportunities and successfully exploit the knowledge and expertise inherent in its science base.

Reaching a consensus on the key areas of science and technology vital to the future of the UK is helping to focus funding and support.

The Foresight findings and recommendations represent a clear guide to the UK's strengths and skills base.

Foresight networks are open to all companies based in the UK. They can provide an inward investor with direct access into the high quality UK science base, and can help them to establish effective links with other businesses in their sector, Government Departments, and regulatory and trade bodies. International companies located in the UK have played an important role in the programme since its launch in 1994.

A number of overseas governments have expressed an interest in the British Foresight model.

Background

- ❖ The Foresight Programme was first announced in the 1993 Government White Paper for Science, Engineering and Technology, *Realising our Potential*.
- ❖ It is spearheaded by 16 panels consisting of representatives from business, Government and academia, set up to explore opportunities in different sectors of the economy.

❖ Following widespread consultation involving some 10,000 people, the panels published their findings in 1995. These reports aimed to identify the likely social, economic and market trends in each sector over the next 10-20 years, and the developments in science, engineering, technology and infrastructure required to best address future needs. The consultation process involved discussions, workshops and seminars, as well as a national questionnaire.

❖ **The 16 sector panels are:** Agriculture, Horticulture & Forestry; Chemicals; Construction; Defence & Aerospace; Energy; Financial Services; Food & Drink; Health & Life Sciences; IT, Electronics & Communications; Leisure & Learning; Manufacturing, Production & Business Processes; Marine; Materials; Natural Resources & Environment; Retail & Distribution; and Transport.

❖ The programme is managed by the Office of Science and Technology (OST) in the Department of Trade and Industry (DTI).

Achievements to date

- ❖ Since the publication of the reports, widespread dissemination of the findings has taken place, involving the panels and many other organisations. For example, over 600 Foresight events have been held to communicate and discuss the Foresight findings, and 130,000 copies of the Foresight panel recommendations have been distributed. Other organisations have produced reports tailoring the Foresight findings to their own sectors.
- ❖ Government Departments, Research Councils, trade associations and professional institutions are actively involved with the programme. (Research Councils are public sector bodies responsible for promoting and supporting basic, strategic, and applied research in specific areas.)
- ❖ Around £1 billion of public and private sector funds has so far been committed to initiatives reflecting Foresight priorities. For example, Government Departments are reflecting the Foresight findings in their development of policy and in their science, engineering and technology spending decisions. Research Councils are also using Foresight recommendations to inform their spending decisions.

❖ Examples of ways in which Government Departments are involved:

- ❶ the Department of Trade and Industry is using Foresight recommendations to direct funding for a number of its technology-related business support schemes. For example, 15 new 'LINK' programmes addressing Foresight priorities have been launched since March 1995. The LINK initiative supports collaborative research between business and the science base. Certain activities under the Government programmes for biotechnology (the 'Crusade for Biotechnology') and information technology (the 'Information Society Initiative'), also respond to specific Foresight findings in these fields;
- ❷ the Ministry of Defence has set up a forum involving DTI and the Defence Evaluation and Research Agency (DERA) to explore dual-use programmes involving Foresight priority technologies;
- ❸ the Department for Education and Employment is sponsoring Industry Training Organisations in 12 different business sectors to explore how their sector can best prepare for the skills and training requirements of the future;

- ④ the Department of the Environment is working together with the Foresight panel on Construction on a number of initiatives, including a research project on meeting client needs through standardisation;
 - ⑤ the Department of Health has set up an R&D forum which brings together industry, Research Councils and the medical research charities to take account of the Foresight findings; and
 - ⑥ the Department of Transport is working with the Foresight panel on Transport on 'Foresight vehicle' and 'urban clear zones' projects. The Foresight vehicle initiative brings together technology providers to exploit market opportunities in the development of a motor vehicle that is environmentally friendly, but still meets market expectations for safety, performance and cost.
- ❖ The programme has been successful in helping to establish networks between the science base and sectors of the economy which have not traditionally had such links, such as, for example, financial services, retail, leisure and construction.

Foresight Challenge

- ❖ The 'Foresight Challenge' competition, launched at the end of 1995, made a significant contribution towards the Foresight aim of increasing the interaction between industry and academia.
- ❖ Through the competition, consortia of business and the science base could apply for funds to undertake projects addressing Foresight priorities. Awards were made to 24 projects, involving total funding of £92 million. Of this, £62 million is provided by the private sector. The remaining £30 million is contributed by OST.
- ❖ Foresight Challenge winners will be working on projects such as:
 - ❶ the development of new catalytic processes to enhance the economic and environmental performance of the UK chemical industry;
 - ❷ the use of computer modelling to develop advanced materials;
 - ❸ applying virtual reality technology developed for the defence industry to the understanding and management of financial risk;

- ④ detecting and preventing Alzheimer's disease;
- ⑤ the use of technologies such as multi-media and 3D in the film, video and computing industries; and
- ⑥ the development of deep sea fish farming.

The way ahead

- ❖ Plans for the next phase of the Foresight programme were published in December 1996. In this phase, the emphasis will be on the wider engagement of business, and on involving functions other than research and development - such as marketing, finance and business planning, for example - in the Foresight process.
- ❖ A number of DTI business support schemes will be used to deliver Foresight.
- ❖ A second national Foresight programme - 'Foresight 2000' - will begin in 1999.

The following Foresight publications can be obtained, free of charge, from the Office of Science and Technology, by faxing a request to +44 (0)171 271 2015.

❖ *Winning through Foresight - A Strategy taking the Foresight Programme to the Millennium.* December 1996, Office of Science and Technology, DTI.

ISBN 0 9529565 1 9. URN 96/1123.

Key Points summary to be available Spring 1997.

❖ *Progress through Partnership - Report from the Steering Group of the Foresight Programme.* 1995, Office of Science and Technology. HMSO. ISBN 0 11 430130 1.

Key Points summary also available.

❖ *Progress through Partnership - Sector panel reports for each of the Foresight panels*.* March 1995, Office of Science and Technology. HMSO.

Key Points summaries also available.

* Following the publication of the panel reports, a number of changes were made to panel structure. The Information Technology & Electronics and Communications panels merged to form one panel, and the Agriculture, Environment & Natural Resources panel was separated into three panels: Agriculture, Horticulture & Forestry, Natural Resources & Environment, and Marine. These last three panels are publishing their reports within the first few months of 1997.

❖ Foresight panels are publishing **Panel Plans** to outline their activities for the next phase of the Foresight programme. These will be available Spring 1997.

❖ Panels occasionally publish discussion papers or other documents relevant to their sector. Please contact the Foresight Directorate with any enquiries.

❖ There are plans for further Foresight publications, details of which will not be available until later in 1997.

For further information please contact:

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